MONTHLY REPORT

[redacted]

25X1

PAR 224

31 Mar 65

SUBJECT: 3 - 15X Fluid Gate Enlarger

TASK/PROBLEM

1. Develop and fabricate an enlarger having continuously variable magnification from 3 to 15X for 70mm negative gate size. Print sizes to range 30 x 40 inches on cut sheet stock.

DISCUSSION

2. Effort has been to continue design and fabrication of a breadboard system which will provide engineering data for this project and also for PAR 202. The accomplishments have been:

a. Vacuum Platen and Carriage: The transluscent platen face has been assembled upon the machined platen casting and tested with the vacuum fan purchased for the breadboard tests. The vacuum hold-down device functions well with only moderate blower noise level and essentially no noise from the air flow at the platen. The major noise source is the blower exhaust. An acoustic enclosure for the fan, including exhaust muffling, is to be tested in the breadboard system.

b. Main Frame: The lower frame and optical frame units were ordered from local subcontractors with delivery promised in April.

c. Lamphouse and Gate Assembly: The detail sketches of this assembly for the breadboard system are about 75 percent complete.

d. Objective Focus Assemblies: Design effort is approximately 90 percent complete and detail sketches are about 50 percent complete.

e. Objective Lenses: The mount designs are completed and were released for fabrication early in the month.

f. Negative Transport Model: Detail sketches of the "non-steering roller model are nearly ready for release.

Declass Review by NGA.

g. Enlarger Control System: The circuit design is completed. Some long delivery components were ordered.

PLANNED ACTIVITY

3. In the next month, we plan to:

a. Begin assembly of components on the optical frame.

b. Release all detail drawings of the lamphouse and of the Objective Focus Assemblies for fabrication.

c. Begin assembly and wiring of subassemblies in the electrical control system.